AMENDMENTS TO THE CLAIMS

1. (Currently amended) A method for improving the efficacy and/or transdermal transport of topically administered pharmaceuticals and pharmacologically active compounds, said method comprising the step of incorporating the pharmaceutical or pharmacologically active compound in a carrier comprising an effective amount of one or more complexes of a phosphorylated lipophilic pharmaceutically acceptable compound;

wherein the lipophilic pharmaceutically acceptable compound is selected from the group consisting of tocopherol, vitamin A (retinol), vitamin K (menadione), tocotrienols, vitamin D (calciferol) and mixtures thereof; and

wherein the complex of a phosphorylated lipophilic pharmaceutically acceptable compound ~~is prepared from~~ comprises a complexing agent selected from the group consisting of arginine, lysine, and laurylaminodipropionic acid ~~and a substituted amine surfactant of the following formula:~~

~~$NR^1R^2R^3$~~

~~wherein R^1 is chosen from the group consisting of straight or branched chain mixed alkyl radicals from C6 to C22 and R(CO), wherein R is chosen from the group consisting of straight or branched chain mixed alkyl radicals from C6 to C22, and R^2 and R^3 are chosen independently from the group consisting of –H, $-CH_2(CO)OX$, $-CH_2CH(OH)CH_2SO_3X$, $-CH_2CH(OH)CH_2OPO_3X_2$, $-CH_2CH_2(CO)OX$, $-CH_2CH_2CH(OH)CH_2SO_3X$, and $-CH_2CH_2CH(OH)CH_2OPO_3X_2$, wherein X is H, Na, K or alkanolamine provided R^2 and R^3 are not both H~~.

2. – 3. (Canceled)

4. (Previously presented) The method according to claim 1, wherein the phosphorylated lipophilic pharmaceutically acceptable compound is selected from the group consisting of monophosphates of the lipophilic pharmaceutically acceptable compound, diphosphates of the lipophilic pharmaceutically acceptable compound, and mixtures thereof.

5. (Previously presented) The method according to claim 1, wherein the effective amount of the one or more complexes of the phosphorylated lipophilic pharmaceutically acceptable compound is in the range from 1 to 90% w/w of the total weight of the carrier.

6. (Previously presented) The method according to claim 5 wherein the effective amount is in the range from 40 to 90% w/w of the total weight of the carrier.

7. (Previously presented) The method according to claim 6 wherein the effective amount is in the range from 45 to 75 % w/w of the total weight of the carrier.

8. (Previously presented) The method according to claim 7 wherein the effective amount is in the range from 50 to 60% w/w of the total weight of the carrier.

9. (Previously presented) The method according to claim 5 wherein the effective amount is in the range from 1 to 15 % w/w of the total weight of the carrier.

10. (Previously presented) The method according to claim 5 wherein the effective amount is in the range from 1 to 10 % w/w of the total weight of the carrier.

11. (Previously presented) The method according to claim 10 wherein the effective amount is in the range from 5 to 10% w/w of the total weight of the carrier.

12. (Previously presented) The method according to claim 1, wherein the one or more complexes of the phosphorylated lipophilic pharmaceutically acceptable compound are selected from the group consisting of one or more complexes of phosphorylated tocopherol, and mixtures thereof.

13. (Previously presented) The method according to claim 12 wherein the one or more complexes of the phosphorylated lipophilic pharmaceutically acceptable compound is selected from the group consisting of laurylaminodipropionic acid tocopheryl monophosphate, laurylaminodipropionic acid tocopheryl diphosphate, and mixtures thereof.

14. (Previously presented) The method according to claim 13, wherein the effective amount of the one or more complexes of phosphorylated tocopherol is in the range of from 0.1 to 10% w/w of the total weight of the carrier.

15. (Previously presented) The method according to claim 14 wherein the effective amount is in the range from 5 to 10% w/w of the total weight of the carrier.

16. (Previously presented) The method according to claim 15 wherein the effective amount is about 7.5% w/w of the total weight of the carrier.

17. (Previously presented) The method according to claim 1, wherein the carrier further comprises excipients selected from the group consisting of solvents, surfactants, emollients, preservatives, colorants, fragrances and mixtures thereof.

18. (Canceled)

19. (Previously presented) The method according to claim 1, wherein the pharmaceutical or pharmacologically active compound is selected from the group consisting of morphine, atropine, estradiol, and testosterone.

20.-25. (Canceled)

26. (Previously presented) The method of claim 1 wherein the pharmacologically active compound is selected from the group consisting of narcotic analgesics including morphine and levorphanol, non narcotic analgesics including codeine and acetominophen, corticosteroids such as cortisone, anesthetics including propofol, antiemetics including scopolamine, sympathomimetic drugs including adrenaline and dopamine, antiepileptic drugs including fosphenytoin, anti-inflammatory drugs including ibuprofen, thyroid hormones and antithyroid drugs including thyroxine, phytochemicals including α-bisabolol, eugenol, silybin, soy isoflavones, iridoid glycosides including aucubin and catapol, sesquiterpene lactones including pseudoguaianolide from *Arnica chamissonis*, terpenes including rosmarinic acid and rosmanol, phenolic glycosides including the salicylates salicin, saligenin and salicylic acid, triterpenes taxasterol or α-lactucerol, and isolactucerol, taraxacoside, hydroquinones including arbutin, phenylalkanones including gingerols and shagaols, hypercin, and acylphloroglucides including xanthohumol, lupulone, humulone and 2-methylbut-3-en-2-ol.